**Code Source:** The source code along with all of the project documents can be found on github with the following link <https://github.com/void380/Project-3>. The source code is in the folder “Project Management System”. The file structure will be broken down and explained below. There are three key aspects of the program, the backend database, the java program, and the windows forms GUI.

The backend database uses a third party tool called Mysql, which is a persistent database management system. By using this tool, all of the clients’ non-functional requirements are met. It is a **robust** system which stores all data efficiently in one central location on the hosts device. This allows other people to connect to the database if they are given the proper user account and privileges. Since access to the database is only given to those with proper credentials from within the system, this makes the program very **secure** and **safe** to use. Mysql also allows billions of entries allowing the program to operate on a very large **capacity**. Also, if the program is installed on a rack mounted server which is always up and running, that means the database will be up 24 hours a day.

**Please note that in order to get the program fully functioning, you will need to set up a Mysql database on your pc and import the datadump in the Mysql Workbench Files folder. Or you can try to follow the instructions in the PMS Software Guide document, however this process is fairly complicated and should be done by a database specialist.**

**Data:** This package in the src folder holds all of the API files which communicate between the java program and the Mysql database queries. All files in here are mapper interfaces.

* ActionItemMapper.java
* DecisionMapper.java
* DeliverableMapper.java
* DocumentReferenceMapper.java
* IssueMapper.java
* RequirementMapper.java
* ResourceMapper.java

**Domains:** This package holds all of the Java class files which represent the objects of the functional requirements. The data from the database is loaded into these objects upon request from the user at the GUI. These objects will then be fed into the GUI event fields to display all the information in the screens demonstrated at the GUI prototype section. All files are named after their respective requirement categories.

* ActionItem.java
* Decision.java
* Deliverable.java
* DocumentReference.java
* DropDownList.java
* Issue.java
* MeetingNote.java
* ReferenceDocument.java
* Requirement.java
* Resource.java
* Task\_Base.java
* Task\_Composite.java
* Task\_Milestone.java
* Task\_Summary.java

**Drivers**: This package holds all of the files which drive the application forward whether that be with input, output, or another API to help communicate between the GUI and the Java program.

* DBController.java
* DeliverableDAO.java
* IOController.java
* RequirementDAO.java
* SqlConnection.java

**Resource:** This package holds all of the .xml files which are used to parse and translate what’s written inside into database queries. It is a language that automatically maps attributes inside the java class files into the Mysql database tables. It also holds the configuration properties which allows the database specialist to set up custom paths to the database.

* ActionItemMapper.xml
* Config.properties
* DecisionMapper.xml
* DeliverableMapper.xml
* DocumentReferenceMapper.xml
* IssueMapper.xml
* Mybatis-config.xml
* RequirementMapper.xml
* ResourceMapper.xml